Conceptual Alternatives Narrative

In meeting its long term transportation and land use goals, the Lincoln City-Lancaster County Comprehensive Plan for the Year 2025 recognizes the importance of expanding opportunities for furthering alternative modes of travel and mobility. The City-County Comprehensive Plan's transportation and mobility chapter -- also known as the Long Range Transportation Plan (LRTP) -- addresses the need to study alternative modes of travel and mobility. The following is the charge from the Comprehensive Plan that states the need for such an effort:

"There should be a community-wide review identifying near- and long-term multi-modal transportation and mobility opportunities for Lincoln and Lancaster County. The study should consider alternative approaches to providing personal transportation services, possible characteristics of service levels, and funding options best serving our community objectives. The study should be completed within approximately two years of the adoption of the Plan."

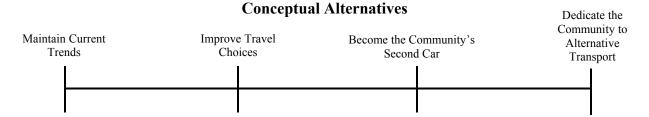
To complete such a study, the Multi Modal Transportation Plan effort has been initiated along with the assembly of the Multi Modal Transportation Task Force. There are three main phases to creating the Multi-Modal Transportation Plan. They include the following:

- Analysis of Conditions
- Conceptual Alternatives and Preliminary Plan Development
- Multi-Modal Transportation Plan

This narrative of conceptual alternatives, along with the conceptual alternatives matrix, is intended to offer a range of multi modal ideas and concepts that will ultimately direct the development of the final Multi Modal Transportation Plan. First, however, a preferred multi modal alternative is to be identified by the Task Force that will provide the foundation for the Preliminary Plan.

In an attempt to arrive at a preferred multi-modal alternative that the Task Force will use to guide the development of the Multi Modal Transportation Plan, a number of ideas and concepts have been assembled into four conceptual alternatives. The alternatives include a range of multi modal tools and policies and are organized under the headings "Maintain Current Trends," "Improve Travel Choices," "Become the Community's Second Car," and "Dedicate the Community to Alternative Transport." The selection of a preferred alternative that includes the Task Force's favored multi modal tools and concepts will shape

what the Preliminary Plan contains as a general indication of how the City expects to write the full Multi Modal Transportation Plan. The Preliminary Plan will be sufficiently general to allow refinement and change but specific enough to give a good sense of the direction the plan will take on the major variables.



The four conceptual alternatives were created to facilitate discussion and debate. Each of these alternatives is general in nature and in no way is a definitive or complete scenario from which the Task Force is to choose or discard. Some multi modal ideas from one alternative may be combined with concepts from other alternatives that ultimately will comprise the Task Force's view of what the Preliminary Plan should include. These alternatives were conceived as "pure," or abstract, forms of the potential course of action. Consequently, none of these alternatives is expected to be selected without modification to guide the completion of the Preliminary Plan. Instead, it is anticipated that one might be generally preferred and some positive aspects of the others incorporated to create the Preliminary Plan. Also, some of the concepts presented are short term in nature, while others are long-term, thus requiring consideration for a factor of time for the range of concepts included in the preferred option.

Each of the four alternatives is presented below. Following the four alternatives is a listing of additional multi modal concepts and tools that may not be specifically included in the four alternatives, but could very well be included in the preferred alternative by the Task Force.

A. Maintain Current Trends

In the "Maintain Current Trends" scenario, very little change would be expected in Lincoln's travel picture. Nearly all travelers in Lincoln who have a choice of travel modes will opt for the automobile, and public investments and policies will continue to support that choice most strongly.

Lincoln will develop in much the same manner as it has the past few decades. Expansion of modal choice will occur only as opportunities arise.

Transit - Maintain Current Trends

The fixed-route bus system will remain and its primary mission will be to act as a safety net within the community. The fixed-route bus service will serve nearly every district of the community with routes along both arterial and local residential streets. The bus system will provide basic transportation service mostly to members of the population who cannot drive for reasons of cost, age or disability. The fixed-route structure will continue to be almost exclusively radial to the Downtown hub, although some limited cross-town routes will be in place. The hours of service will be roughly 6 AM to 6 PM Monday through Saturday.



Funding for both fixed-route and demand-responsive service will be adjusted for inflation so that service frequency and hours of operation remain at present levels. This will translate into minimal changes to the waiting and riding environments, although StarTran will implement an Automatic Vehicle Location (AVL) system on demand-responsive vans and fixed-route buses to provide real-time arrival information. Also, smart card technology will be implemented for automated fare payment. There will be no significant changes in the operation of the demand-responsive service which will continue to be shared between StarTran and private companies. Coordination of these services will continue to be a major effort. The creation of a transit authority for transit administration purposes will continue to be explored.

Bicycling and Walking - Maintain Current Trends

The trails network will be developed and linked consistent with present plans, and multi-use trails will be included with identified arterial roads. High priority projects will include completing the MoPac and Salt Creek Trails into Downtown and the Antelope Valley project. Trails on school routes will continue to be kept free of snow and ice. Sidewalks will continue to be required along almost all new

public streets, except limited access highways and in very low-density areas, at the standard 4 foot width along residential streets and the 5 foot width along arterial roads. Multi-use trails will be built at the AASHTO standard of 10 feet and may be built wider when conditions warrant. Only bicycle-friendly grates will be used in new roadway construction.



Rock Island Trail, Lincoln, NE

The national Safe Routes to School program will continue to be implemented. Some major street crossings will include features such as grade separation, crosswalk striping, refuge islands, count-down crossing signals, crossing request buttons, curb bump-outs, and pedestrian warning signals. The Pedestrian and Bicycle Advisory Committee will be continued.

Land Use Pattern - Maintain Current Trends

The general pattern of land development will continue to be strongly oriented toward single-family housing and the separation of different types of housing. There will be some locations of mid- and high-density housing, shops and offices outside the Downtown, although few will be designed in a manner different from the current auto-friendly approach. Site design for businesses and multi family housing will continue to favor the auto driver with minimal accommodation for bus riders, bicyclists or pedestrians.

The Downtown will continue as a center for offices, housing, government, entertainment, and education, but more and more business will find it attractive to locate on the fringe of town where the availability of land will be plentiful. Public policy and investments will help ensure that the parking supply keeps pace with the rising demand.

Street System - Maintain Current Trends

The street system internal to new neighborhoods will continue to be curvilinear, interconnected and without designated collector streets. The road network and parking supply will continue to be sized and priced to provide minimal inconvenience to the driving community. Congestion will increase at peak hours

and in certain locations, and average trip lengths will grow with the community.

Funding - Maintain Current Trends

Funding for both fixed-route and demand-responsive service will be adjusted for inflation so that service frequency and hours of operation remain at present levels. The trails network will continue to be funded for further development of the planned network.

Concepts in Use - Maintain Current Trends

Fixed-route bus system
Limited cross-town express routes
Public/private demand-responsive service
Automatic vehicle location technology
Private intercity transit services
Support transit preferential features
10 foot wide AASHTO standard trails
National Safe Routes to School program
4-5 foot wide sidewalks
PBAC continued
Parking supply keeps pace with demand

Radial bus system from Downtown
Transit authority discussions
Informal carpools/vanpools
Smart card technology
Bus turnouts
Trails network developed as planned
Bicycle friendly grates in new streets
Limited use of bike racks
Some pedestrian crossing amenities
Limited transit friendly development
Streets curvilinear/no collectors

B. Improve Travel Choices

Alternatives to driving alone will become a viable choice for an increasing percentage of the population as public investments and policies are adjusted to gradually shift habits and perceptions. The City, County and State governments, along with the University, will become advocates for improved multi-modal opportunities.

Lincoln will be acknowledged as a competitive and progressive mid-sized city able to provide a range of options in movement, neighborhoods and work settings.

Transit - Improve Travel Choices

The primary mission for transit will be twofold: to act as a community safety net for transit-dependent people, and to be a viable travel option for increasingly diverse travel markets. The initial choice of travel markets to target will include University students, staff and faculty, along with State, City and County staff. Further expansion of travel markets into the general public will occur as conditions improve for transit use.

The fixed-route bus system will be concentrated in those portions of Lincoln that have shown the highest ridership in the past. Some routes will be reshaped into stronger transit corridors. Service frequency and hours of operation will be greatly increased on the favored routes. Some additional grid and express routes will be added as target markets are identified. A formal Downtown transit hub will be created with a secondary hub at the University possible. Total bus ridership is expected to rise moderately.



Transit Hub, Minneapolis, MN

Underperforming routes will be replaced with a demand-responsive service to maintain broad community coverage using smaller vehicles or taxis. The specialized demand-responsive service will be privately operated. Coordination

of these services will continue to be a major effort. A transit authority for transit administration purposes will be created.

StarTran will expand an Automatic Vehicle Location (AVL) system on demandresponsive vans and fixed-route buses to provide real-time arrival information. Also, smart card technology will be expanded for automated fare payment purposes.

A local area circulator or trolley will make it easy to get around the Downtown, thus enlarging the available business markets in this area. An historic trolley, rubber tired or rail, may operate in the Haymarket.



Railway Trolley, Galveston, TX

The City will establish a rideshare advocate and seek the endorsement of ridesharing by major employees to develop interest in multi modal options. Park and ride lots will be sought through private initiatives. Traffic signal priority along key corridors will be implemented. Commuter service to and from outlying employment areas will be provided at peak hours via vans or small buses. A stronger relationship between the City of Lincoln and the University of Nebraska will be pursued to coordinate multi modal efforts.

Bicycling and Walking - Improve Travel Choices

The trails network will be developed and linked consistent with present plans, and the urban system of trails will be expanded. All trails will be kept free of snow and ice. Multi-use trails will be included with future arterial roads and will be built 12 feet wide to accommodate higher traffic volumes, two abreast riding and a variety of users (bicyclists, walkers, runners, in-line skaters). On-street bicycle lanes will be added to some existing streets where space exists. Only bicycle-friendly grates will be used in new street construction and older grates will be replaced to be bicycle friendly. Bicycle racks and lockers will be promoted at commercial sites and will be installed at some major bus stops, especially in the Downtown. City-wide bicycle and walking route information will be provided on paper and on signs.



Trail Signage, Pedestrian and Bicycle Information Center

The national Safe Routes to School program will continue to be implemented. Schools will be sited and designed to aid access by bicycling and walking. A bicyclist education program will be implemented. Education about bicycling and walking will be provided by the city for design professionals, City staff, and law enforcement officers. The city and StarTran will initiate an annual "bike-bus-and-car-pool to work" day. Traffic regulations will be more strictly enforced for bicyclists so as to improve safety and elevate their status as vehicles.

Sidewalks will be built along almost all new public streets except limited access highways and in very low-density areas. Five foot sidewalks will be standard in residential areas and six to eight foot sidewalks will be standard along arterial roads. Most major street crossings will include amenities such as grade separations, crosswalk striping, refuge islands, count-down crossing signals, crossing request buttons, curb bump-outs, and pedestrian warning signals. Some linkages to the fringe sidewalk system will be made within commercial and multifamily housing sites. The Pedestrian and Bicycle Advisory Committee will be continued. Improved coordination between city departments addressing bicycling and walking issues will be sought.

Land Use Pattern - Improve Travel Choices

The traditional Lincoln pattern of single-family neighborhoods will continue but will be interspersed with more locations of mid- and high-density housing, shops and offices, and many of them will be designed with more regard for transit, bicycling and walking. These locations will become destinations for those alternative modes by virtue of their range of offerings and design. A pedestrian and transit zoning overlay district that supports multi modal development will be created. In some instances, sidewalks and site planning will be used to connect buildings with the sidewalk system at the perimeter of development sites.

The Downtown will grow as a center for offices, housing, government, entertainment and education. Major employers will be encouraged to locate or remain in Downtown through a combination of incentives, an attractive downtown environment, and convenient access through a wider range of transportation options.

Street System - Improve Travel Choices

The street system internal to new neighborhoods will continue to be curvilinear and interconnected but will include a continuous north-south and a continuous east-west street across each square-mile neighborhood. The road system will be redesigned in some locations to better accommodate buses, bicyclists and pedestrians.

Funding - Improve Travel Choices

Funding for both fixed-route and demand-responsive service will be increased moderately to provide better service, vehicles and facilities. New ways of funding transit will be sought. Marketing transit will become a strong activity.

Concepts in Use - Improve Travel Choices

Performance based fixed-route bus system Radial bus system from Downtown Expanded express routes Creation of transit authority Transit corridors Downtown transit hub Private demand-responsive service Local-area circulator Rideshare advocate for carpools/vanpools Historic trolley in Haymarket Initial private park-n-ride lots Traffic signal priority in corridors Automatic vehicle location technology Smart card technology Outlying area commuter service Private intercity transit services Travel demand management Bus turnouts Support transit preferential features Some on-road bike-lanes Urban trails network expanded Bicycle friendly grates in new streets Bicyclist education conducted 12 foot wide standard trails Older grates retrofitted National Safe Routes to School Bike racks promoted and installed Bike-bus-carpool to work day More pedestrian crossing amenities Multi modal school site planning 5-8 foot wide sidewalks More transit friendly development PBAC continued Collector streets installed Transit friendly zoning overlay disctrict Traffic laws more strictly enforced Some retrofitting of road system Multi modal partnership with UNL

C. Become the Community's Second Car

Under this scenario, Lincoln will evolve toward a community in which riding the bus, bicycling and walking are common and acceptable means of travel for all segments of the population as a result of a fundamental shift in city and State investments and policies sustained over many decades. City form will gradually be reshaped with more and better transit-friendly nodes and centers. Transit will be considered a service that much more closely matches people's travel desires.

Lincoln will be recognized as being among the leaders in providing a combination of travel options that are attractive substitutes for driving on many trips. New patterns of city development will help make those travel changes feasible. The aim of transit will be to provide a high-amenity customer experience.

Transit - Become the Community's Second Car

The fixed-route bus service will serve every district of the community with a combination of lines along arterial roads, service to high-density mixed-use centers, express routes, and local circulators. Bus rapid transit (BRT) will be introduced between major regional centers with bus lanes in key corridors. There will be use of bus bypass areas (queue jumpers) at selected locations.



Bus Rapid Transit Bus Lane, Eugene, OR



Bus Bypass Area (Queue Jumper), Eugene, OR

Transit hubs will be commonplace. A multi-modal hub will be located in the Downtown, and other hubs at the University and at other major outlying mixed-use centers will be established. Bus ridership will grow dramatically as it becomes competitive with driving alone in terms of cost, comfort and speed. Routes will initially be pruned as described in the "Improve Travel Choices" alternative then gradually expanded as land use changes. Additional demandresponsive service will be provided in fringe areas by private providers. Special commuter service to outlying areas and counties will be arranged through employers.

Local area circulators or trolleys will make it easy to get around the Downtown and other major centers, thus enlarging the available business markets in these areas. An historic trolley, rubber tired or rail, will operate in the Haymarket.

An expanded role for a transit authority will be explored to expand its authority to include administration of alternative transportation options and parking. StarTran will increase use of an Automatic Vehicle Location (AVL) system on demandresponsive vans and fixed-route buses to provide real-time arrival information. Also, smart card technology will be expanded for automated fare payment, payment for parking, and use on the trolley service. Traveler information services will be available on the street, at nodes and from home. Service availability, arrivals, access and cost information will be provided. A traffic signal priority system will be instituted. Carpool and vanpool incentives will be provided by employers and the public sector. Park-n-ride lots will be developed through public/private partnerships.

Transit service to and from Omaha will be provided at peak hours and mid-day via buses or possibly commuter rail over time. The city will establish voluntary compliance with major employers for mode share or transit goals by area of town, type of development, or target area. Expanded coordination between the City of Lincoln and the University of Nebraska will be established for increased multi modal efforts.

Road design will make extensive use of bus bypass lanes, high occupancy vehicle lanes, signal preemption, and exclusive bus pick-up lanes. The Downtown parking supply will be managed so that inventory can be adjusted in accordance with increased use of transit, bicycling, and walking. The cost to park in the Downtown will increase to make driving a substantially more expensive choice as compared to the increased choices for transit, bicycling, and walking.

Bicycling and Walking- Become the Community's Second Car

Multi-use trails will be included with future arterial roads. Both the urban and rural system of trails will be expanded, and all existing arterial roads will be retrofitted with multi-use trails. Numerous links from the trails to a bicycle lane system will be created. On-street bicycle lanes will be added to key streets by, in

some cases, removing parking, and lanes will be extended across bridges either on-street or on a widened sidewalk.



On-Street Bicycle Lane, Pedestrian and Bicycle Information Center

All streets will be considered part of the bicycle network with traffic calming measures applied to troublesome local and collector streets. Only bicycle friendly grates will be used on new and existing streets. Multi-use trails will be built 12 to 14 feet wide to accommodate higher traffic volumes, two-abreast riding, and a variety of users such as bicyclists, walkers, runners, and in-line skaters. Centerline and edge striping will be included. Consistent and attractive signs and maps will be installed system-wide. The striping, signage, surface smoothness, and cleanliness will be maintained to a high level. The City will improve the riding and walking experience through improved landscaping. The City, County, and State will increase funding for the Salt Valley Heritage Greenway/Beltway.

Bicycle racks will be suggested and supported at all retail and office buildings, multi family housing, and schools, and will be placed in convenient locations. Bicycle lockers will be installed in the Downtown, at the University, and at other major transit stops. A cost share program for these amenities will be instituted through the city. Bicycle racks will be required on all buses. City-wide bicycle routes will be provided on paper and signs.



Bike Rack on Bus, Pedestrian and Bicycle Information Center

The national Safe Routes to School program will continue to be implemented. Schools will be sited and designed to aid access by bicycling and walking. A bicyclist education program will be conducted. Drivers will be educated regarding the rights and obligations of bicyclists in the street. Education about bicycling and walking will be provided by the City for design professionals, City staff, and law enforcement officers. The City and StarTran will initiate an annual "bike-bus-and-car-pool to work" day. Traffic regulations will be more strictly enforced for bicyclists so as to improve safety and elevate their status as vehicles. Laws will be changed to give bicyclists priority in the street.

Sidewalks will be installed along both sides of all public streets except on limited access highways and in very low-density areas. Five foot sidewalks will be standard in residential areas and six to eight foot sidewalks will be standard along arterial roads. All intersections will include curb ramps perpendicular to the street, and short curb radii will be used on all streets except major arterials.



Pedestrian Amenities at Intersections, Pedestrian and Bicycle Information Center

Safe crossings will be provided for all busy roads, bridges, rail lines, and similar barriers. Major street crossings will include features such as grade separations, crosswalk striping, refuge islands, count-down crossing signals, crossing request buttons, curb bump-outs, and pedestrian warning signals.

Free flow right turns will not be allowed except on major arterial roads. All bridges will include sidewalks. Exceptional accommodations will be made for pedestrians at commercial, office, and multi family housing sites. Even in areas with auto-dominated land uses, more direct and pleasant walking paths to transit stops will maximize access to transit to reduce the perceived walking time. The Pedestrian and Bicycle Advisory Committee will be continued. A walking and biking advocate will be designated in City Hall.

Land Use and Urban Design - Become the Community's Second Car

Pedestrian and transit friendly zoning requirements will be enforced, along with changes to the Comprehensive Plan, that will allow city form to gradually be reshaped with more and better transit and pedestrian friendly nodes and centers. Each major neighborhood will include a variety of housing types and densities. Some future commercial, office, and multi family housing will be planned to be located in dense and diverse centers that are oriented toward the street and transit stops with exceptional accommodations for pedestrians and bicyclists. Facade and streetscape design will be used to improve the walking experience and shorten the perceived trip to transit. Some future development will be vertically mixed (i.e., housing over shops), and there will be a greater use of parking structures. Buses and carpools will be granted a front-door entrance to major developments. Transit will be given a more visually prominent role in the community through shelter placement, open space, landscaping, lighting, access and architecture

The Downtown will grow aggressively as a major center for offices, housing, government, entertainment and education. Density will increase throughout the Downtown, and significant redevelopment will occur in Antelope Valley and around the University. The Downtown parking supply will be adjusted to account for increased transit use, bicycling, and walking, and parking rates will be increased to make driving to Downtown less competitive with other modes of transportation.

Street System - Become the Community's Second Car

The street system internal to new neighborhoods will be designed to be fully interconnected and include north-south and east-west collectors. Some expansion plans for the arterial road network will be deferred as fewer auto trips are evident in some corridors. Bike lanes will be installed on some of these roadways instead of being expanded for more auto lanes. Pedestrians and bicyclists will be accommodated on all roads except the limited access highways.

Funding - Become the Community's Second Car

Funding from all sources will be greatly expanded as the city and State make a conscious commitment to introduce new forms of transit, improve customer amenities and provide a different style of city.

Concepts in Use - Become the Community's Second Car

Performance based fixed-route bus system Bus rapid transit along corridors Transit corridors

More private demand-responsive service Public/private carpool incentives offered Expanded public/private park-n-ride lots Automatic vehicle location technology Outlying area commuter service

Exclusive bus pick-up lanes
High occupancy vehicle lanes

Commuter bus and van to/from Omaha Voluntary travel demand management Urban & rural trails network expanded

Bicycle lane system instituted
12-14 foot wide standard trails

Signage and maps on bike system High level of maintenance for bike lanes

Bicyclist education program Drivers educated on bicycles

Laws changed in favor of bicyclists Bike racks required on all buses

National Safe Routes to School program Multi modal school site planning

5-8 foot wide sidewalks

PBAC continued

Require pedestrian/transit zoning Downsizing of future road system Multi modal partnership with UNL Bus routes between transit hubs Traveler information services

Downtown & University transit hubs Numerous local-area circulators

Historic trolley in Haymarket

Smart card technology

Bus bypass lanes (queue jumpers)

Signal preemption
Streetscaping

Walking and bicycling advocate
Possible commuter rail service
Transit hub in outlying center

Existing arterials retrofitted for trails

Increased landscaping

Bicycle friendly grates on all streets High level of maintenance on trails Removal of parking for bike lanes

Traffic calming measures

Traffic laws more strictly enforced

Limited free flow right turns

Bike lockers installed

Bike racks required in developments

Bike-bus-carpool to work day Pedestrian crossing features

More transit friendly development

Collector streets installed Auto parking disincentives

Discuss expanded transit authority

D. Dedicate the Community to Alternative Transport

Under this scenario, Lincoln will make a powerful and lasting commitment to recreate itself as a community that provides a full range of transportation alternatives including transit, bicycling and walking in addition to the automobile. Significant public spending on transportation improvements will be dedicated to transit, bicycling, and walking, and urban form will be strictly guided to reinforce that effort. Lincoln will emerge as a model of sustainable community planning for the 21st Century with a transportation system that provides a number of legitimate travel options.

Transit - Dedicate the Community to Alternative Transport

The transit system will serve every corner of the city through a combination of buses, light-rail, taxis, demand-responsive service and possibly selective deployment of personal rapid transit.

Transit services will be linked with each other at multi-modal stations (hubs) distributed throughout the community. The backbone of the system will be light rail transit (LRT) lines and busways, which will connect major urban centers including the Downtown, University, and major new nodes. One or two light rail transit lines will be built along transit corridors to link major and minor urban centers. Bus routes will be realigned to feed into the LRT stations.



Light Rail Transit Stop, Dallas Area Rapid Transit

Several downtown streets will be converted to transit malls to accommodate the blend of LRT vehicles and buses. Fixed-route buses will run at short intervals along all major streets and will transport passengers to many destinations, as well as make connections with LRT stations and park-and-ride lots for outlying residents. Private taxis will provide personalized service night and day to eligible users, while demand-responsive accessible service will serve riders needing wheelchairs or similar assistance.

Local-area circulators or trolleys will make it easy to get around the Downtown and other major centers, thus enlarging the available business markets in those locations. An historic trolley, rubber-tired or rail, will operate in the Haymarket. Commuter service between Lincoln and Omaha will be provided several times a day, first by buses and later by passenger rail. A grant funded demonstration of personal rapid transit (PRT) technology may be located at the University.



Commuter Train, Chicago METRA

StarTran will make extensive use of Automatic Vehicle Location (AVL) system on demand-responsive vans and fixed-route buses to provide real-time arrival information. Also, smart card technology will be commonplace for automated fare payment, parking payment, and Downtown trolley use. Traveler information services will be easily attainable on the street, at nodes and from home. Service availability, arrivals, access and cost information will be provided. An expanded role for a transit authority will be created to expand its authority to include administration of alternative transportation options and parking.

Transit into the major employment centers will be aided by controlling the number of available public and private parking spaces. Incentives will be provided by employers and the public sector for carpooling and vanpooling, and park-n-ride lots will be developed along appropriate commuting corridors throughout the community. A traffic signal priority system will be widespread.

The Downtown parking supply will be adjusted to account for increased transit use, bicycling, and walking, and rates will be increased to make driving to Downtown less competitive with other modes of transportation. The City will establish mandatory compliance with mode share or transit goals by area of town, type of development, or target area. The City of Lincoln and the University of Nebraska will have fully coordinated multi modal efforts.

Bicycling and Walking - Dedicate the Community to Alternative Transport

Bicycling and walking will become a practical and commonplace means to travel to work, school, shopping, and other trips by virtue of the vastly improved infrastructure and urban density. Recreational trips will also benefit as the system will be attractive, interesting and safe. The trails network will be expanded and linked into every sector of the city, beyond present plans. Every available floodplain corridor, abandoned rail line and former highway right-of-way will receive a paved trail suitable for bicycling, walking, running and skating.

Secondary off-road corridors will be routed into every major neighborhood or district to connect housing, parks, shops and offices. Grade separation and/or traffic control will be provided at all intersections with arterial roads. All existing arterial roads will be retrofitted with multi-use trails. The City will add more landscaping, and the City, County, and State will increase funding for the Salt Valley Heritage Greenway/Beltway. Multi-use trails will be built 12 to 14 feet wide to accommodate higher traffic volumes, two-abreast riding, and a variety of users such as bicyclists, walkers, runners, and in-line skaters. Centerline and edge striping will be included. Consistent and attractive signs and maps will be installed system-wide. The striping, signage, surface smoothness, and cleanliness will be maintained to a high level.



Wide Multi-Use Trail, Long Beach, CA

Complementing the off-road trails will be an extensive grid of on-road striped bike lanes along arterial and collector streets. Lanes will be added to key streets by removing parking if necessary. Every local street will be designed to be supportive of bicycling through attention to features such as traffic calming, connectivity, signage, and bicycle friendly grates.



On-Road Striped Bike Lane, Pedestrian and Bicycle Information Center

Bicycle racks will be required for all retail and office buildings, multi family housing, and schools in convenient locations. Lockers will be installed in the Downtown, at the University, and other major transit stops. A cost-share program for this amenity will be instituted through the city. Major employers and building owners will be encouraged to provide shower and changing areas. Bicycle racks will be included on all buses. Bicycles will be allowed on LRT and inter-city commuter trains. Convenient bicycle parking will be included at many transit stops.

The national Safe Routes to School program will continue to be implemented. Schools will be sited and designed to aid access by bicycling and walking. A bicyclist education program will be conducted. Drivers will be educated regarding the rights and obligations of bicyclists in the street. Education about bicycling and walking will be provided by the city for design professionals, city staff, and law enforcement officers. The City and StarTran will initiate an annual "bike-bus-and-car-pool to work" day. Traffic regulations will be more strictly enforced for bicyclists so as to improve safety and elevate their status as vehicles. Laws will be changed to give bicyclists priority in the street.

The City will promote the concept of "street reclaiming" to promote the safe, social, and recreational uses of streets, including traffic calming, in-street block parties, and a "slow down" bumper sticker campaign.

The City will be flooded with publicly-owned bicycles for anyone to use so that cars will rarely be needed for short trips.

All commercial, industrial and multi-family housing developments will be designed for easy internal circulation on foot or bike as well as short, convenient connections to bus or LRT stops or the trail network.



Bicycle and Pedestrian Friendly Environment, Madison, WI

Sidewalks will be installed along both sides of all public streets except on limited access highways and in very low-density areas. Five foot sidewalks will be standard in residential areas and six to eight foot sidewalks will be standard along arterial roads. All intersections will include curb ramps perpendicular to the street, and short curb radii will be used on all streets except major arterials. Safe crossings will be provided for all busy roads, bridges, rail lines, and similar barriers. Major street crossings will include features such as grade separation, crosswalk striping, refuge islands, count-down crossing signals, crossing request buttons, curb bump-outs, and pedestrian warning signals. Free flow right turns will not be allowed except on major arterial roads. All bridges will include sidewalks. The Pedestrian and Bicycle Advisory Committee will be continued. A walking and biking advocate will be designated in City Hall. Laws will be changed to give pedestrians priority when they step into the street.

Land Use and Urban Design - Dedicate the Community to Alternative Transport

All future commercial, office and multiple-family housing will be planned to be located in dense and diverse centers that are oriented toward transit with exceptional accommodations for pedestrians and bicyclists. Existing districts, including some low-density housing, will be redeveloped into transit-supportive nodes. All buildings in those centers will be located next to the street sidewalk in traditional urban patterns. Architecture and urban design will help make walking a pleasure. The City and county will implement these land use and urban design changes by amending its Comprehensive Plan, rewriting its zoning ordinance, and capitalizing on several redevelopment programs.

Buses, LRT and, eventually, PRT as demand warrants and funding becomes available, will be granted preferential access to all major developments. Transit will be given a visually prominent status through land use planning, urban design, plazas, landscaping, lighting, and architecture.

The Downtown will dramatically grow as a major center for offices, housing, government, entertainment and education. Density will increase throughout the Downtown, and significant redevelopment will occur in Antelope Valley and around the University. An auto-free zone and a transit mall will be created in the Downtown to promote walking and transit. Other major mixed-use centers will be created throughout the community through coordinated private and public efforts. They will be highly transit-oriented, served by several radial routes, and linked to the original Downtown via transit corridors, which will include several transit-supportive centers of development. In these centers, all future development will be vertically mixed (e.g., housing over shops) and there will be a greater use of parking structures.

Street System - Dedicate the Community to Alternative Transport

The street system internal to new neighborhoods will be designed to be totally interconnected and include north-south and east-west collectors. Future residential collector streets will provide direct and continuous routes across each square-mile neighborhood. Expansion plans for the arterial road network will be scaled back except as needed to accommodate buses in order to promote the transition to transit. Pedestrians and bicyclists will be accommodated on all roads except the limited access highways. Bike lanes will be installed on some roadways instead of being expanded for more auto lanes.

Funding - Dedicate the Community to Alternative Transport

Funding from all sources will be greatly expanded as the City and State make a conscious commitment to introduce new forms of transit, improve customer amenities and create a dramatically different style of city.

Concepts in Use - Dedicate the Community to **Alternative Transport**

Light rail transit is backbone of system

Bus routes connect urban centers

Private demand responsive accessible transit Traveler information services

Transit friendly development Taxis provide private services

Public/private carpool incentives offered

Expanded park-n-ride lots

Automatic vehicle location technology

Outlying area commuter service Exclusive bus pick-up lanes

High occupancy vehicle lanes

Commuter rail to/from Omaha

Mandatory travel demand management Urban & rural trails network expanded

Bicycle lanes instituted systemwide

12-14 foot wide standard trails Signage and maps on bike system

High level of maintenance for bike lanes

Bicyclist education program Drivers educated on bicycles

Laws changed in favor of bicyclists

Bike racks required on all buses

National Safe Routes to School program

Multi modal school site planning 5-8 foot wide sidewalks

PBAC continued

Require pedestrian/transit zoning Downsizing of future road system Downtown auto free transit malls

Street reclaiming program

Multi modal partnership with UNL

Bus system compliments LRT

Fixed-route buses on short intervals

Downtown & University transit hubs

Numerous local-area circulators Historic trolley in Haymarket

Smart card technology

Bus bypass lanes

Signal preemption

Streetscaping

Walking and bicycling advocate

Transit corridors

Transit hubs in outlying centers

Existing arterials retrofitted for trails

Increased landscaping

Bicycle friendly grates on all streets High level of maintenance on trails

Removal of parking for bike lanes

Traffic calming measures

Traffic laws more strictly enforced

Limited free flow right turns

Bike lockers installed

Bike racks required in developments

Bike-bus-carpool to work day Pedestrian crossing amenities Bike showers/changing areas Collector streets installed

Auto parking disincentives

Bike racks allowed on trains

Laws changed in favor of pedestrians Create expanded transit authority

Additional Multi Modal Tools

The following is a listing of multi modal related terms and concepts that were not specifically referenced in the above alternatives. Some, all, or none of these ideas may be useful as part of the Task Force's preferred alternative. Again, this is not intended to be an exhaustive listing of multi modal concepts, but rather a starting point for discussion and plan development.

Establish a coordinated transportation incident management center

Advocate State to create pedestrian/bicycle plan as part of NDOR TIP

Reduced transit fares in the Downtown

Free transit fares for elderly

Free transit fares for disabled

Congestion pricing

Escorted commuter bike rides

"Bike Central" stations with showers, changing areas, bike storage at transit hubs Support bicycle and pedestrian advocacy programs

Develop a formal City of Lincoln/UNL multi modal partnership

Conduct a grade school bicycling and pedestrian education program

Establish a formal list of multi modal benchmarks such as % of streets with bike lanes, connectivity of trail system, inventory of bicycle parking availability, % of children biking and walking to school, % of bicycle

network completed, Census work trip modal split information, bus ridership numbers, implementation of multi modal measures

Reestablish evening transit service with increased ridership

Reestablish Sunday transit service with increased ridership

Development of additional funding programs/revenue sources

Reallocate existing transportation funding sources

Interest-free bicycle loans

Establish short-term and long-term benchmark goals for multi modal efforts

Satellite Downtown parking

Formal bicycle/pedestrian accident review process

Creation of a walkability index for specific areas of the city

Creation of a bike-lane suitability index for specific roadways

Fund public awareness programs to explain benefits of walking and biking

Create bicycle boulevards on local streets

Sponsor an adopt-a-bikeway program

Install signal detection loops in pavement of bike-lanes

Formalize a bicycle/transit coordination program

Conduct neighborhood walking and biking workshops

Sponsor "bicycle to the movies, mall, school, work" days

Subsidize purchase of bike locks

Create a clearinghouse for all bicycle and pedestrian related laws and policies for the City of Lincoln and the State of Nebraska

Conduct an annual "Lincoln Bike Ride" Day

Require bicycle parking spaces at all office, commercial, and multi family sites

Location-efficient mortgages

Car sharing